



**UNITED STATES DEPARTMENT OF COMMERCE  
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SERIAL NUMBER	FILING DATE	FIRST NAMED APPLICANT	ATTORNEY DOCKET NO.
08/324,835	10/18/94	MIYAZAKI	T TLI18438

21M1/0206  
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PALADIN EXAMINER	
ART UNIT	PAPER NUMBER
2107	7

DATE MAILED:

02/06/96

**Please find below a communication from the EXAMINER in charge of this application.**

Commissioner of Patents

# Office Action Summary

Application No.

08/324,835

Applicant(s)

Miyazaki et al.

Examiner

Albert W. Paladini

Group Art Unit

2107



☒ Responsive to communication(s) filed on Dec 18, 1995

☒ This action is **FINAL**.

☐ Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

A shortened statutory period for response to this action is set to expire 3 month(s), or thirty days, whichever is longer, from the mailing date of this communication. Failure to respond within the period for response will cause the application to become abandoned. (35 U.S.C. § 133). Extensions of time may be obtained under the provisions of 37 CFR 1.136(a).

## Disposition of Claims

☒ Claim(s) 1-10 is/are pending in the application.

Of the above, claim(s) 1 is/are withdrawn from consideration.

☐ Claim(s) \_\_\_\_\_ is/are allowed.

☒ Claim(s) 2-10 is/are rejected.

☐ Claim(s) \_\_\_\_\_ is/are objected to.

☐ Claims \_\_\_\_\_ are subject to restriction or election requirement.

## Application Papers

☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.

☐ The drawing(s) filed on \_\_\_\_\_ is/are objected to by the Examiner.

☐ The proposed drawing correction, filed on \_\_\_\_\_ is ☐ approved ☐ disapproved.

☐ The specification is objected to by the Examiner.

☐ The oath or declaration is objected to by the Examiner.

## Priority under 35 U.S.C. § 119

☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).

☐ All ☐ Some\* ☐ None of the CERTIFIED copies of the priority documents have been  
☐ received.

☐ received in Application No. (Series Code/Serial Number) \_\_\_\_\_

☐ received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\*Certified copies not received: \_\_\_\_\_

☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).

## Attachment(s)

☐ Notice of References Cited, PTO-892

☐ Information Disclosure Statement(s), PTO-1449, Paper No(s). \_\_\_\_\_

☐ Interview Summary, PTO-413

☐ Notice of Draftsperson's Patent Drawing Review, PTO-948

☐ Notice of Informal Patent Application, PTO-152

--- SEE OFFICE ACTION ON THE FOLLOWING PAGES ---

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1. Applicant's arguments filed on 12/18/95 have been fully considered and have resulted in the following:

The rejections to the specifications and the drawings concerning the second current source are withdrawn.

The applicant's arguments concerning the 35 USC 103 rejection are not deemed to be persuasive.

On pages 7 and 8 the applicant describes details of the Kopec reference and then states "Thus, the purpose of Kopec et al. in utilizing a comparator 22 for controlling the opening and closing of a switch S1 represents a structural and functional arrangement clearly different what is defined in claim 2 of the instant application." The applicant does not explain specifically the perceived difference between Kopec and the claim.

The applicant contends on page 8 that the disclosed invention is applied specifically to an "integrated overdrive circuit" and the combined teachings of the references Stoll and Kopec do not specifically address this application. There is nothing specific in this invention that addresses the specific characteristics of an overdrive circuit and limits its application to an overdrive circuit.

2. The following is a quotation of 35 U.S.C. § 103 which forms the basis for all obviousness rejections set forth in this Office action:

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A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Subject matter developed by another person, which qualifies as prior art only under subsection (f) or (g) of section 102 of this title, shall not preclude patentability under this section where the subject matter and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person.

Claim 1 rejected under 35 U.S.C. § 103 as being unpatentable over Stoll in view of Kopec.

In figure 1 stoll discloses a circuit which controls a solenoid switch 10. When a switching signal is applied at terminal 11, the internal logic of the circuit causes transistor 27 to be turned on and supply the high current needed to close solenoid switch 10. Capacitor 20 starts charging until the output of NAND gate 21 changes from 1 to 0 which turns transistor 27 off and stops the flow of current. Components 21 -25 essentially constitute a multivibrator which then switches transistor 27 on and off at a selected frequency in order to generate a second low current needed to keep the switch 10 closed. This second current is between 1/10 to 1/20 of the initial high current required to close switch 10. The selected value of capacitor 20 sets the predetermined time period from the time the first high current closes the switching solenoid 10 to the time when the second low current drives the switching solenoid

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10. Stoll does not disclose two current sources and two circuits to operate these current sources as recited in the claims.

In figure 1 Kopec discloses two circuits with two current sources I1 and I2 which can operate switching element S1. The first circuit is microprocessor 28 which operates the first higher current source I1 via switch SA. When the desired conditions are met, the second circuit, which consists of comparator 22 and microprocessor 28, opens switch SA which cuts off high current source I1 and closes switch SB which activates low current source I2 to control switching element S1.

If it were desired to have precise current control for the low and high level currents, it would be obvious to one skilled in the art to add the two current source system developed by Kopec to the switch control system developed by Stoll.

3. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 C.F.R. § 1.136(a).

A SHORTENED STATUTORY PERIOD FOR RESPONSE TO THIS FINAL ACTION IS SET TO EXPIRE THREE MONTHS FROM THE DATE OF THIS ACTION. IN THE EVENT A FIRST RESPONSE IS FILED WITHIN TWO MONTHS OF THE MAILING DATE OF THIS FINAL ACTION AND THE ADVISORY ACTION IS NOT MAILED UNTIL AFTER THE END OF THE THREE-MONTH SHORTENED STATUTORY PERIOD, THEN THE SHORTENED STATUTORY PERIOD WILL EXPIRE ON THE DATE THE ADVISORY ACTION IS MAILED, AND ANY EXTENSION FEE PURSUANT TO 37 C.F.R. § 1.136(a) WILL BE CALCULATED FROM THE MAILING DATE OF THE ADVISORY ACTION. IN NO EVENT WILL

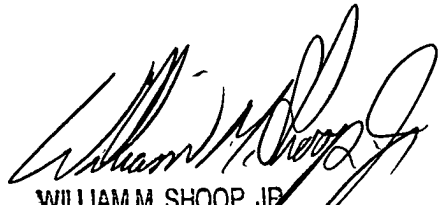
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THE STATUTORY PERIOD FOR RESPONSE EXPIRE LATER THAN SIX MONTHS  
FROM THE DATE OF THIS FINAL ACTION.

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Albert Paladini whose telephone number is (703) 308-2005. Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 308-1782.



WILLIAM M. SHOOP, JR.  
SUPERVISORY PATENT EXAMINER  
ART UNIT 217